



EMSL Analytical, Inc.
307 West 38th Street, New York, NY 10018

Phone: (212) 290-0051 Fax: (212) 290-0058 Email: manhattanlab@emsl.com

201970



Attn: **Kim Alvestad**
AECOM Technical Services, Inc.
4840 Cox Road
Richmond, VA 23060

Fax: (804) 515-8305 Phone: (804) 515-8300
Project: **60134596/ HELLER HEAT TREATING**

Customer ID: EART59
Customer PO:
Received: 01/13/10 10:27 AM
EMSL Order: 031000780
EMSL Proj:
Analysis Date: 1/13/2010

Test Report: Asbestos Analysis of Bulk Materials via EPA 600/R-93/116 Method using Polarized Light Microscopy

Sample	Description	Appearance	<u>Non-Asbestos</u>		<u>Asbestos</u>	
			% Fibrous	% Non-Fibrous	% Type	
AUST PIT II 031000780-0001	AUSTEMPER PIT INSULATION	Gray Fibrous Homogeneous	55% Min. Wool	15% Ca Carbonate 30% Non-fibrous (other)	None Detected	

NO ASBESTOS

Analyst(s)

Sean Scales (1)

James Hall
James Hall, Laboratory Manager
or other approved signatory

Due to magnification limitations inherent in PLM, asbestos fibers in dimensions below the resolution capability of PLM may not be detected. The limit of detection as stated in the method is 1%. The above test report relates only to the items tested and may not be reproduced in any form without the express written approval of EMSL Analytical, Inc. EMSL's liability is limited to the cost of analysis. EMSL bears no responsibility for sample collection activities or analytical method limitations. Interpretation and use of test results are the responsibility of the client. Samples received in good condition unless otherwise noted. This report must not be used to claim product endorsement by NVLAP or any agency of the U.S. Government.

Samples analyzed by EMSL Analytical, Inc. New York 307 West 38th Street, New York NY NVLAP Lab Code 101048-9, AIHA-LAP, LLC-IHLAP Lab 102581, NYS ELAP 11506, NJ NY022, CT PH-0170, MA AA000170



EMSL ANALYTICAL, INC.
LABORATORY • PRODUCTS • TRAINING

Asbestos Chain of Custody

EMSL Order Number (Lab Use Only):

031000780

EMSL ANALYTICAL, INC.
107 HADDON AVENUE
WESTMONT, NJ 08108
PHONE: (856) 858-4800
FAX: (856) 858-4960

Company : AECOM		EMSL-Bill to: <input checked="" type="checkbox"/> Same <input type="checkbox"/> Different If Bill to is Different note instructions in Comments**	
Street: 4840 Cox Rd		Third Party Billing requires written authorization from third party	
City: Glen Allen	State/Province: VA	Zip/Postal Code: 23060	Country: USA
Report To (Name): Kim Alvestad		Fax #:	
Telephone #: 804-515-8300		Email Address: kimberly.alvestad@aecom.com	
Project Name/Number: Heller Heat Treating 60134596			
Please Provide Results: <input type="checkbox"/> Fax <input checked="" type="checkbox"/> Email		Purchase Order: U.S. State Samples Taken: NJ	
Turnaround Time (TAT) Options* - Please Check			
<input type="checkbox"/> 3 Hours <input type="checkbox"/> 6 Hours <input checked="" type="checkbox"/> 24 Hrs <input type="checkbox"/> 48 Hrs <input type="checkbox"/> 3 Days <input type="checkbox"/> 4 Days <input type="checkbox"/> 5 Days <input type="checkbox"/> 10 Days			
*For TEM Air 3 hours/6 hours, please call ahead to schedule. *There is a premium charge for 3 Hour TEM AHERA or EPA Level II TAT. You will be asked to sign an authorization form for this service. Analysis completed in accordance with EMSL's Terms and Conditions located in the Analytical Price Guide.			
PCM - Air <input type="checkbox"/> NIOSH 7400 <input type="checkbox"/> w/ OSHA 8hr. TWA PLM - Bulk (reporting limit) <input checked="" type="checkbox"/> PLM EPA 600/R-93/116 (<1%) <input type="checkbox"/> PLM EPA NOB (<1%) Point Count <input type="checkbox"/> 400 (<0.25%) <input type="checkbox"/> 1000 (<0.1%) Point Count w/Gravimetric <input type="checkbox"/> 400 (<0.25%) <input type="checkbox"/> 1000 (<0.1%) <input type="checkbox"/> NYS 198.1 (friable in NY) <input type="checkbox"/> NYS 198.6 NOB (non-friable-NY) <input type="checkbox"/> NIOSH 9002 (<1%)		TEM - Air <input type="checkbox"/> AHERA 40 CFR, Part 763 <input type="checkbox"/> NIOSH 7402 <input type="checkbox"/> EPA Level II <input type="checkbox"/> ISO 10312 TEM - Bulk <input type="checkbox"/> TEM EPA NOB <input type="checkbox"/> NYS NOB 198.4 (non-friable-NY) <input type="checkbox"/> Chatfield SOP <input type="checkbox"/> TEM Mass Analysis-EPA 600 sec. 2.5 TEM - Water: EPA 100.2 Fibers >10µm <input type="checkbox"/> Waste <input type="checkbox"/> Drinking All Fiber Sizes <input type="checkbox"/> Waste <input type="checkbox"/> Drinking	
		TEM- Dust <input type="checkbox"/> Microvac - ASTM D 5755 <input type="checkbox"/> Wipe - ASTM D6480 <input type="checkbox"/> Carpet Sonication (EPA 600/J-93/167) Soil/Rock/Vermiculite <input type="checkbox"/> PLM CARB 435 - A (0.25% sensitivity) <input type="checkbox"/> PLM CARB 435 - B (0.1% sensitivity) <input type="checkbox"/> TEM CARB 435 - B (0.1% sensitivity) <input type="checkbox"/> TEM CARB 435 - C (0.01% sensitivity) <input type="checkbox"/> EPA Protocol (Semi-Quantitative) <input type="checkbox"/> EPA Protocol (Quantitative) Other: <input type="checkbox"/>	
<input type="checkbox"/> Check For Positive Stop - Clearly Identify Homogenous Group			
Samplers Name: W.H. Haynes		Samplers Signature: <i>W.H. Haynes</i>	
Sample #	Sample Description	Volume/Area (Air) HA # (Bulk)	Date/Time Sampled
Aust Pit II	Austemper Pit Insulation	Bulk	1-12-10 16:00
<div style="text-align: center;"> </div>		<div style="text-align: center;"> </div>	
Client Sample # (s):		Total # of Samples: ONE	
Relinquished (Client): <i>W.H. Haynes / W.H. Haynes</i>		Date: 1/12/10	
Received (Lab): <i>Steer</i>		Time: 16:30 (FEDAX)	
Comments/Special Instructions:		Date: 1/13	
		Time:	

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Attn: **AECOM Technical Services, Inc.**
4840 Cox Road
Richmond, VA 23060

Fax: (804) 515-8305 Phone: (804) 515-8300
Project: **60134596/ HELLER HEAT TREATING/ NJ**

Customer ID: EART59
Customer PO:
Received: 12/10/09 10:02 AM
EMSL Order: 030930743
EMSL Proj:
Analysis Date: 12/10/2009

Sampling Date: 12/8/2009

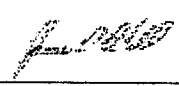
Test Report: Asbestos Fiber Analysis by Transmission Electron Microscopy (TEM)
Performed by EPA 40 CFR Part 763 Appendix A to Subpart E

Sample	Location	Volume (Liters)	Area Analyzed (mm ²)	Non Asb	Asbestos Type(s)	# Structures		Analytical Sensitivity (S/cc)	Asbestos Concentration	
						$\geq 0.5\mu$	$< 5\mu$		(S/mm ²)	(S/cc)
AH-A-A1	PERIMETER BACKGROUND AIR SAMPLE	405.00	0.1950	0	None Detected			0.0049	<5.10	<0.0049
030930743-0001										
AH-A-A2	PERIMETER DOWNWIND BY LOADING DOCK BLDG. 5	405.00	0.1950	3	None Detected			0.0049	<5.10	<0.0049
030930743-0002										
AH-A-A3	PERIMETER DOWNWIND BTWN BLDG 1 AND 4	405.00	0.1950	0	None Detected			0.0049	<5.10	<0.0049
030930743-0003										
AH-A-A4	PERIMETER DOWNWIND BTWN BLDG 1 AND 4	405.00	0.1950	0	None Detected			0.0049	<5.10	<0.0049
030930743-0004										
AH-A-P1	PERSONAL AIR MONITORING	345.00	0.2340	0	None Detected			0.0048	<4.30	<0.0048
030930743-0005										
AH-A-P2	PERSONAL AIR MONITORING	339.00	0.2340	17	Amosite	0	2	0.0049	8.50	0.0097
030930743-0006										
AH-A-P3	PERSONAL AIR MONITORING	327.00	0.2470	1	Amosite	1	1	0.0048	8.10	0.0095
030930743-0007										

Analyst(s)

David Chen (3)

Evie Sioukri (5)


James Hall, Laboratory Manager
or other approved signatory

The laboratory is not responsible for data reported in structures/cc, which is dependent on volume collected by non-laboratory personnel. This lab is only responsible for data reported in structures/mm². This report may not be reproduced, except in full, without written approval by EMSL. This report must not be used to claim product endorsement by NVLAP or any agency of the U.S. Government. This report relates only to the samples reported above. Quality control data (including 95% confidence limits and laboratory and analysts' accuracy and precision) is available upon request. As per 40 CFR 763, the initial screening test may not be applied to samples with collected volumes of <1200 liters. The test results contained within this report meet the requirements of NELAC unless otherwise noted. Samples received in good condition unless otherwise noted.

Samples analyzed by EMSL Analytical, Inc. New York 307 West 38th Street, New York NY NVLAP Lab Code 101048-9, AIHA IHLAP 102581, NYS ELAP 11506, CT PH-0170, MA AA000170

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EMSL Order: 030930743
EMSL Proj:
Analysis Date: 12/10/2009

Sampling Date: 12/8/2009

Test Report: Asbestos Fiber Analysis by Transmission Electron Microscopy (TEM)
Performed by EPA 40 CFR Part 763 Appendix A to Subpart E

Sample	Location	Volume (Liters)	Area Analyzed (mm ²)	Non Asb	Asbestos Type(s)	# Structures		Analytical Sensitivity (S/cc)	Asbestos Concentration	
						≥ 0.5μ < 5μ	≥ 5μ		(S/mm ²)	(S/cc)
AH-A-P4	PERSONAL AIR MONITORING	333.00	0.2340	2	Amosite	0	1	0.0049	4.30	0.0049

030930743-0008

Analyst(s)

David Chen (3)

Evie Sioukri (5)


James Hall, Laboratory Manager
or other approved signatory

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Customer ID: EART59
Customer PO:
Received: 12/10/09 10:02 AM
EMSL Order: 030930743
EMSL Proj:
Analysis Date: 12/10/2009

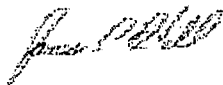
Test Report: Fiber Count by Phase Contrast Microscopy (PCM), NIOSH 7400 Method,
Revision 3, Issue 2, 8/15/94

Sample	Location	Sample Date	Volume (liters)	Fibers	Fields	LOD (fib/cc)	Fibers/ mm ²	Fibers/ cc	Notes
AH-A-P1 030930743-0009	PERSONAL AIR MONITORING	12/8/2009	345.00	20	100	0.008	25.5	0.028	
AH-A-P2 030930743-0010	PERSONAL AIR MONITORING	12/8/2009	339.00	67.5	100	0.008	86	0.098	
AH-A-P3 030930743-0011	PERSONAL AIR MONITORING	12/8/2009	327.00	13.5	100	0.008	17.2	0.020	
AH-A-P4 030930743-0012	PERSONAL AIR MONITORING	12/8/2009	333.00	36.5	100	0.008	46.5	0.054	

No discernable field blanks submitted with this sample set.

Analyst(s)

Daniya Chugunova (4)


James Hall, Laboratory Manager
or other approved signatory

Limit of detection is 7 fibers/mm². Interlaboratory Sr values: 5-20 fibers = 0.35, 21-50 fibers = 0.30, 51-100 fibers = 0.20. The laboratory is not responsible for data reported in fibers/cc, which is dependent on volume collected by non-laboratory personnel. This report relates only to the samples reported above. This report may not be reproduced, except in full, without written approval by EMSL. Results have been blank corrected as applicable. Samples received in good condition unless otherwise noted.
Samples analyzed by EMSL Analytical, Inc. New York 307 West 38th Street, New York NY 10018 IHLAP 102581, NYS ELAP 11506, CT PH-0170, MA AA000170



EMSL ANALYTICAL, INC.
LABORATORY PRODUCTS - TEAMWORK

Asbestos Chain of Custody

EMSL Order Number (Lab Use Only):

030930743 - ~~030930743~~

030930743 - ~~030930743~~

EMSL ANALYTICAL, INC.

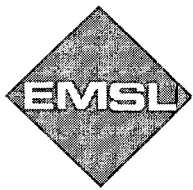
107 HADDON AVENUE

WESTMONT, NJ 08108

PHONE: (856) 858-4800

FAX: (856) 858-4960

Company: AECOM		EMSL-Bill to: <input checked="" type="checkbox"/> Same <input type="checkbox"/> Different If Bill to is Different, note instructions in Comments	
Street: 4840 Cox Rd		Third Party Billing requires written authorization from third party	
City: Glen Allen	State/Province: VA	Zip/Postal Code: 23060	Country: USA
Report To (Name): Kim Alvestad		Fax #:	
Telephone #: 804-515-8300		Email Address: kimberly.alvestad@aecom.com	
Project Name/Number: Heller Heat Treating 60134596			
Please Provide Results: <input type="checkbox"/> Fax <input checked="" type="checkbox"/> Email		Purchase Order: U.S. State Samples Taken: NJ	
Turnaround Time (TAT) Options* - Please Check:			
<input type="checkbox"/> 3 Hours <input type="checkbox"/> 6 Hours <input checked="" type="checkbox"/> 24 Hrs <input type="checkbox"/> 48 Hrs <input type="checkbox"/> 3 Days <input type="checkbox"/> 4 Days <input type="checkbox"/> 5 Days <input type="checkbox"/> 10 Days			
*For TEM Air 3 hours/6 hours, please call ahead to schedule. There is a premium charge for 3 Hour TEM AHERA or EPA Level II TAT. You will be asked to sign an authorization form for this service. Analysis completed in accordance with EMSL's Terms and Conditions located in the Analytical Price Guide.			
PCM - Air <input checked="" type="checkbox"/> NIOSH 7400 <input type="checkbox"/> w/ OSHA 8hr. TWVA		TEM - Air <input checked="" type="checkbox"/> AHERA 40 CFR, Part 763 <input checked="" type="checkbox"/> NIOSH 7402 <input type="checkbox"/> EPA Level II <input type="checkbox"/> ISO 10312	
PLM - Bulk (reporting limit) <input type="checkbox"/> PLM EPA 600/R-93/116 (<1%) <input type="checkbox"/> PLM EPA NOB (<1%) Point Count <input type="checkbox"/> 400 (<0.25%) <input type="checkbox"/> 1000 (<0.1%) Point Count w/ Gravimetric <input type="checkbox"/> 400 (<0.25%) <input type="checkbox"/> 1000 (<0.1%) <input type="checkbox"/> NYS 198.1 (friable in NY) <input type="checkbox"/> NYS 198.6 NOB (non-friable-NY) <input type="checkbox"/> NIOSH 9002 (<1%)		TEM - Bulk <input type="checkbox"/> TEM EPA NOB <input type="checkbox"/> NYS NOB 198.4 (non-friable-NY) <input type="checkbox"/> Chatfield SOP <input type="checkbox"/> TEM Mass Analysis-EPA 600 sec. 2.5 TEM - Water: EPA 100.2 Fibers >10µm: <input type="checkbox"/> Waste <input type="checkbox"/> Drinking All Fiber Sizes: <input type="checkbox"/> Waste <input type="checkbox"/> Drinking	
TEM - Dust: <input type="checkbox"/> Microvac - ASTM D 5755 <input type="checkbox"/> Wipe - ASTM D6480 <input type="checkbox"/> Carpet Sonication (EPA 600/J-93/167)		Soil/Rock/Vermiculite: <input type="checkbox"/> PLM CARB 435 - A (0.25% sensitivity) <input type="checkbox"/> PLM CARB 435 - B (0.1% sensitivity) <input type="checkbox"/> TEM CARB 435 - B (0.1% sensitivity) <input type="checkbox"/> TEM CARB 435 - C (0.01% sensitivity) <input type="checkbox"/> EPA Protocol (Semi-Quantitative) <input type="checkbox"/> EPA Protocol (Quantitative)	
<input type="checkbox"/> Other:			
<input type="checkbox"/> Check For Positive Stop - Clearly Identify Homogenous Group			
Samplers Name: Kelli Lucarino		Samplers Signature:	
Sample #	Sample Description	Volume/Area (Air) HA # (Bulk)	Date/Time Sampled
AH-A-A1	Perimeter, Background Air Sample	405 L/min	12/8/09 13:15 to 15:30
AH-A-A2	Perimeter, Downwind by loading dock Building 5	405 L/min	2/8/09 13:15 to 15:30
AH-A-A3	Perimeter, Downwind between bldgs 1 and 4	405 L/min	2/8/09 13:15 to 15:30
AH-A-A4	Perimeter, Downwind by entrance to bldg 4	405 L/min	2/8/09 13:15 to 15:30
AH-A-P1	Personal air monitoring	345 L/min	12/8/09 13:35 to 15:30
AH-A-P2	Personal air monitoring	339 L/min	12/8/09 13:35 to 15:30
AH-A-P3	Personal air monitoring	327 L/min	12/8/09 13:35 to 15:30
AH-A-P4	Personal air monitoring	333 L/min	12/8/09 13:35 to 15:30
Client Sample # (s):		Total # of Samples: 8	
Relinquished (Client): Kelli Lucarino		Date: 12/9/09	
Received (Lab): Kathy Cox		Date: 12/10/09	
Comments/Special Instructions: As per conversations, Cris D'Onofrio, USEPA and Jim Hall.		Time: 1400	
		Time: 10:02am	



PACKING LIST

ORDER NO	DATE	PAGE NO
86045744	12/7/2009	1

CUSTOMER P/O NUMBER
none provided

BILL TO: AECOM Technical Services, Inc.
4840 Cox Road
Glen Allen, VA 23060

SHIP TO: AECOM
5 Wellington Street
Clifton, NJ 07011

CUSTOMER NO	SHIP DATE	SHIP VIA	SHIPPING INSTRUCTION
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EART59 12/8/2009

Feis Prior Over
CINNAMINSON

Order Date: 12/7/2009

QTY ORDERED	QTY TO SHIP	ITEM NO	UOM	QTY PACKED
-------------	-------------	---------	-----	------------

1.00

8715001B
ASBESTOS TEM 25mm .45 Cassette
/ 50 pk

BX

TOTAL QTY ORDERED

1.00

TOTAL QTY PACKED

0.00



EMSL ANALYTICAL, INC.
LABORATORY • PRODUCTS • TRAINING

Chain of Custody

EMSL Order Number (Lab Use Only):

EMSL ANALYTICAL, INC.
107 HADDON AVENUE
WESTMONT, NJ 08108
PHONE: (856) 858-4800
FAX: (856) 858-4960

Company :		EMSL-Bill to: <input type="checkbox"/> Same <input type="checkbox"/> Different If Bill to is Different note instructions in Comments**	
Street:		Third Party Billing requires written authorization from third party	
City:	State/Province:	Zip/Postal Code:	Country:
Report To (Name):		Fax #:	
Telephone #:		Email Address:	
Project Name/Number:			
Please Provide Results: <input type="checkbox"/> Fax <input type="checkbox"/> Email		Purchase Order:	U.S. State Samples Taken:
Turnaround Time (TAT) Options* - Please Check			
<input type="checkbox"/> 3 Hours <input type="checkbox"/> 6 Hours <input type="checkbox"/> 24 Hours <input type="checkbox"/> 48 Hours <input type="checkbox"/> 3 Days <input type="checkbox"/> 4 Days <input type="checkbox"/> 5 Days <input type="checkbox"/> 2 Weeks			
*For RUSH TAT's Please Call Ahead to Confirm Lab Hours and Availability			
Asbestos			
PCM - Air <input type="checkbox"/> NIOSH 7400 <input type="checkbox"/> w/ 8hr. TWA	PLM - Bulk <input type="checkbox"/> PLM EPA 600/R-93/116 <input type="checkbox"/> PLM EPA NOB (<1%) <input type="checkbox"/> NYS 198.1 (friable-NY) <input type="checkbox"/> NYS 198.6 (non-friable-NY) Point Count <input type="checkbox"/> 400 (<0.25%) <input type="checkbox"/> 1000 (<0.1%) Point Count w/ Gravimetric <input type="checkbox"/> 400 (<0.25%) <input type="checkbox"/> 1000 (<0.1%)	TEM - Bulk <input type="checkbox"/> TEM EPA NOB <input type="checkbox"/> NYS NOB 198.4 (non-friable-NY) <input type="checkbox"/> Chatfield SOP	
TEM - Air <input type="checkbox"/> AHERA 40 CFR, Part 763 <input type="checkbox"/> NIOSH 7402 <input type="checkbox"/> EPA Level II <input type="checkbox"/> ISO 10312	TEM - Water Fibers >10µm <input type="checkbox"/> Waste <input type="checkbox"/> Drinking All Fiber Sizes <input type="checkbox"/> Waste <input type="checkbox"/> Drinking	Soil/Rock/Vermiculite <input type="checkbox"/> PLM CARB 435 - A (0.25% sensitivity) <input type="checkbox"/> PLM CARB 435 - B (0.1% sensitivity) <input type="checkbox"/> TEM CARB 435 - B (0.1% sensitivity) <input type="checkbox"/> EPA Reg. 1 Screening Protocol (Qualitative)	
TEM - Dust <input type="checkbox"/> Microvac - ASTM D 5755 <input type="checkbox"/> Wipe-ASTM D6480		Other:	
Lead (Pb)		Materials Science	
Flame Atomic Absorption <input type="checkbox"/> Chips SW846-7000B or AOAC 974.02 <input type="checkbox"/> Soil SW846-7000B/7420 <input type="checkbox"/> Air NIOSH 7082 <input type="checkbox"/> Wastewater SM3111B or SW846-7000B/7420 <input type="checkbox"/> ASTM Wipe SW846-7000B/7420 <input type="checkbox"/> non ASTM Wipe SW846-7000B/7420 <input type="checkbox"/> TCLP SW846-1311/7420/SM 3111B	ICP <input type="checkbox"/> Air NIOSH 7300 Modified <input type="checkbox"/> non ASTM Wipe SW846-6010B or C <input type="checkbox"/> ASTM Wipe SW846-6010B or C <input type="checkbox"/> Soil SW846-6010 B or C <input type="checkbox"/> Waste Water SW846-6010B or C <input type="checkbox"/> TCLP SW846-6010B or C	<input type="checkbox"/> Common Particle ID (large particles) <input type="checkbox"/> Full Particle ID (environmental dust) <input type="checkbox"/> Basic Material ID (solids) <input type="checkbox"/> Advanced Material ID <input type="checkbox"/> Physical Testing (Tensile, Compression) <input type="checkbox"/> Combustion-by-products (soot, char, etc.) <input type="checkbox"/> X-Ray Fluorescence (elem. analysis) <input type="checkbox"/> X-Ray Diffraction (Crystalline Part.) <input type="checkbox"/> MMVF's (Fibrous glass, RCF's) <input type="checkbox"/> Particle Size (sieve/microscopy/laser) <input type="checkbox"/> Combustible Dust <input type="checkbox"/> Petrographic Examination Other: <input type="checkbox"/>	
Graphite Furnace Atomic Absorption <input type="checkbox"/> Soil SW846-7421 <input type="checkbox"/> Wastewater EPA 200.9 <input type="checkbox"/> Air NIOSH 7105 <input type="checkbox"/> Drinking Water EPA 200.9		Other: <input type="checkbox"/>	
Microbiology			
Wipe and Bulk Samples <input type="checkbox"/> Mold & Fungi - Direct Examination <input type="checkbox"/> Mold & Fungi Culture (Genus Only) <input type="checkbox"/> Mold & Fungi Culture (Genus & Species) <input type="checkbox"/> Bacterial Count & ID (Up to Three Types) <input type="checkbox"/> Bacterial Count & ID (Up to Five Types) <input type="checkbox"/> MRSA <input type="checkbox"/> <i>Pseudomonas aeruginosa</i>	Air Samples <input type="checkbox"/> Mold & Fungi (Spore Trap) <input type="checkbox"/> Mold & Fungi Culture (Genus Only) <input type="checkbox"/> Mold & Fungi (Genus & Species) <input type="checkbox"/> Bacterial Culture & ID (Up to Three Types) <input type="checkbox"/> Bacterial Culture & ID (Up to Five Types) <input type="checkbox"/> Endotoxin Testing Real Time Q-PCR (See Analytical Guide for Code) Code: <input type="text"/> Legionella <input type="checkbox"/> Level 1 <input type="checkbox"/> Level 2 <input type="checkbox"/> Level 3 <input type="checkbox"/> Level 4 Other: <input type="checkbox"/>	IAQ Nuisance Dust NIOSH <input type="checkbox"/> 0500 <input type="checkbox"/> 0600 Airborne Dust <input type="checkbox"/> PM10 <input type="checkbox"/> TSP Silica Analysis: <input type="checkbox"/> All Species Silica Analysis - Single Species <input type="checkbox"/> Alpha Quartz <input type="checkbox"/> Cristobalite <input type="checkbox"/> Tridymite <input type="checkbox"/> HVAC Efficiency <input type="checkbox"/> Carbon Black <input type="checkbox"/> Airborne Oil Mist Radon Testing: Call for Kit and COC Other: <input type="checkbox"/>	
Water Samples <input type="checkbox"/> Total Coliform & E. coli (P/A) <input type="checkbox"/> Fecal Coliform (SM 9222D) <input type="checkbox"/> Sewage Screen <input type="checkbox"/> Heterotrophic Plate Count (SM 9215)			
**Comments/Special Instructions:			
Client Sample #'s		Total # of Samples:	
Relinquished (Client):	Date:	Time:	
Received (Lab):	Date:	Time:	

Analysis Completed in Accordance with EMSL's Terms and Conditions located in the Analytical Price Guide



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LABORATORY • PRODUCTS • TRAINING

Chain of Custody

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Street:		Third Party Billing requires written authorization from third party	
City:	State/Province:	Zip/Postal Code:	Country:
Report To (Name):		Fax #:	
Telephone #:		Email Address:	
Project Name/Number:			
Please Provide Results: <input type="checkbox"/> Fax <input type="checkbox"/> Email		Purchase Order:	U.S. State Samples Taken:

Turnaround Time (TAT) Options* - Please Check

☐ 3 Hours ☐ 6 Hours ☐ 24 Hours ☐ 48 Hours ☐ 3 Days ☐ 4 Days ☐ 5 Days ☐ 2 Weeks

*For RUSH TAT's Please Call Ahead to Confirm Lab Hours and Availability

Asbestos

PCM - Air <input type="checkbox"/> NIOSH 7400 <input type="checkbox"/> w/ 8hr. TWA	PLM - Bulk <input type="checkbox"/> PLM EPA 600/R-93/116 <input type="checkbox"/> PLM EPA NOB (<1%) <input type="checkbox"/> NYS 198.1 (friable-NY) <input type="checkbox"/> NYS 198.6 (non-friable-NY) Point Count <input type="checkbox"/> 400 (<0.25%) <input type="checkbox"/> 1000 (<0.1%) Point Count w/ Gravimetric <input type="checkbox"/> 400 (<0.25%) <input type="checkbox"/> 1000 (<0.1%)	TEM - Bulk <input type="checkbox"/> TEM EPA NOB <input type="checkbox"/> NYS NOB 198.4 (non-friable-NY) <input type="checkbox"/> Chatfield SOP
TEM - Air <input type="checkbox"/> AHERA 40 CFR, Part 763 <input type="checkbox"/> NIOSH 7402 <input type="checkbox"/> EPA Level II <input type="checkbox"/> ISO 10312	TEM - Dust <input type="checkbox"/> Microvac - ASTM D 5755 <input type="checkbox"/> Wipe-ASTM D6480	Soil/Rock/Vermiculite <input type="checkbox"/> PLM CARB 435 - A (0.25% sensitivity) <input type="checkbox"/> PLM CARB 435 - B (0.1% sensitivity) <input type="checkbox"/> TEM CARB 435 - B (0.1% sensitivity) <input type="checkbox"/> EPA Reg. 1 Screening Protocol (Qualitative)
TEM - Water Fibers $\geq 10\mu m$ <input type="checkbox"/> Waste <input type="checkbox"/> Drinking All Fiber Sizes <input type="checkbox"/> Waste <input type="checkbox"/> Drinking	Other:	

Lead (Pb)

Flame Atomic Absorption <input type="checkbox"/> Chips SW846-7000B or AOAC 974.02 <input type="checkbox"/> Soil SW846-7000B/7420 <input type="checkbox"/> Air NIOSH 7082 <input type="checkbox"/> Wastewater SM3111B or SW846-7000B/7420 <input type="checkbox"/> ASTM Wipe SW846-7000B/7420 <input type="checkbox"/> non ASTM Wipe SW846-7000B/7420 <input type="checkbox"/> TCLP SW846-1311/7420/SM 3111B	ICP <input type="checkbox"/> Air NIOSH 7300 Modified <input type="checkbox"/> non ASTM Wipe SW846-6010B or C <input type="checkbox"/> ASTM Wipe SW846-6010B or C <input type="checkbox"/> Soil SW846-6010 B or C <input type="checkbox"/> Waste Water SW846-6010B or C <input type="checkbox"/> TCLP SW846-6010B or C
Graphite Furnace Atomic Absorption <input type="checkbox"/> Soil SW846-7421 <input type="checkbox"/> Wastewater EPA 200.9 <input type="checkbox"/> Air NIOSH 7105 <input type="checkbox"/> Drinking Water EPA 200.9	Other: <input type="checkbox"/>

Microbiology

Wipe and Bulk Samples <input type="checkbox"/> Mold & Fungi - Direct Examination <input type="checkbox"/> Mold & Fungi Culture (Genus Only) <input type="checkbox"/> Mold & Fungi Culture (Genus & Species) <input type="checkbox"/> Bacterial Count & ID (Up to Three Types) <input type="checkbox"/> Bacterial Count & ID (Up to Five Types) <input type="checkbox"/> MRSA <input type="checkbox"/> <i>Pseudomonas aeruginosa</i>	Air Samples <input type="checkbox"/> Mold & Fungi (Spore Trap) <input type="checkbox"/> Mold & Fungi Culture (Genus Only) <input type="checkbox"/> Mold & Fungi (Genus & Species) <input type="checkbox"/> Bacterial Culture & ID (Up to Three Types) <input type="checkbox"/> Bacterial Culture & ID (Up to Five Types) <input type="checkbox"/> Endotoxin Testing Real Time Q-PCR (See Analytical Guide for Code) Code: _____ Legionella <input type="checkbox"/> Level 1 <input type="checkbox"/> Level 2 <input type="checkbox"/> Level 3 <input type="checkbox"/> Level 4 Other: <input type="checkbox"/>
Water Samples <input type="checkbox"/> Total Coliform & E.coli (P/A) <input type="checkbox"/> Fecal Coliform (SM 9222D) <input type="checkbox"/> Sewage Screen <input type="checkbox"/> Heterotrophic Plate Count (SM 9215)	

Materials Science

<input type="checkbox"/> Common Particle ID (large particles) <input type="checkbox"/> Full Particle ID (environmental dust) <input type="checkbox"/> Basic Material ID (solids) <input type="checkbox"/> Advanced Material ID <input type="checkbox"/> Physical Testing (Tensile, Compression) <input type="checkbox"/> Combustion-by-products (soot, char, etc.) <input type="checkbox"/> X-Ray Fluorescence (elem. analysis) <input type="checkbox"/> X-Ray Diffraction (Crystalline Part.) <input type="checkbox"/> MMVF's (Fibrous glass, RCF's) <input type="checkbox"/> Particle Size (sieve/microscopy/laser) <input type="checkbox"/> Combustible Dust <input type="checkbox"/> Petrographic Examination Other: <input type="checkbox"/>
--

IAQ

Nuisance Dust NIOSH <input type="checkbox"/> 0500 <input type="checkbox"/> 0600 Airborne Dust <input type="checkbox"/> PM10 <input type="checkbox"/> TSP Silica Analysis: <input type="checkbox"/> All Species Silica Analysis - Single Species <input type="checkbox"/> Alpha Quartz <input type="checkbox"/> Cristobalite <input type="checkbox"/> Tridymite <input type="checkbox"/> HVAC Efficiency <input type="checkbox"/> Carbon Black <input type="checkbox"/> Airborne Oil Mist Radon Testing: Call for Kit and COC Other: <input type="checkbox"/>
--

**Comments/Special Instructions:

Client Sample #'s		Total # of Samples:
Relinquished (Client):	Date:	Time:
Received (Lab):	Date:	Time:

Analysis Completed in Accordance with EMSL's Terms and Conditions located in the Analytical Price Guide



EMSL ANALYTICAL, INC.
LABORATORY • PRODUCTS • TRAINING

Chain of Custody

EMSL Order Number (Lab Use Only):

EMSL ANALYTICAL, INC.
107 HADDON AVENUE
WESTMONT, NJ 08108
PHONE: (856) 858-4800
FAX: (856) 858-4960

Sample #	Sample Description	Volume/Area (Air) HA # (Bulk)	Date/Time Sampled

*Comments/Special Instructions:

Analysis Completed in Accordance with EMSL's Terms and Conditions located in the Analytical Price Guide



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**EMSL Analytical, Inc.**

307 West 38th Street, New York, NY 10018

Phone: (212) 290-0051 Fax: (212) 290-0058 Email: manhattanlab@emsl.com

Attn: **AECOM Technical Services, Inc.**
4840 Cox Road
Richmond, VA 23060

Fax: (804) 515-8305 Phone: (804) 515-8300

Project: **60134596/ HELLER HEAT TREATING/ NJ**

Customer ID: EART59

Customer PO:

Received: 12/10/09 10:02 AM

EMSL Order: 030930743

EMSL Proj:

Analysis Date: 12/10/2009

Sampling Date: 12/8/2009

Test Report: Asbestos Fiber Analysis by Transmission Electron Microscopy (TEM)
Performed by EPA 40 CFR Part 763 Appendix A to Subpart E

Sample	Location	Volume (Liters)	Area Analyzed (mm ²)	Non Asb	Asbestos Type(s)	# Structures		Analytical Sensitivity (S/cc)	Asbestos Concentration	
						≥ 0.5μ	< 5μ		(S/mm ²)	(S/cc)
AH-A-A1	PERIMETER BACKGROUND AIR SAMPLE	405.00	0.1950	0	None Detected			0.0049	<5.10	<0.0049
030930743-0001										
AH-A-A2	PERIMETER DOWNWIND BY LOADING DOCK BLDG 5	405.00	0.1950	3	None Detected			0.0049	<5.10	<0.0049
030930743-0002										
AH-A-A3	PERIMETER DOWNWIND BTWN BLDG 1 AND 4	405.00	0.1950	0	None Detected			0.0049	<5.10	<0.0049
030930743-0003										
AH-A-A4	PERIMETER DOWNWIND BTWN BLDG 1 AND 4	405.00	0.1950	0	None Detected			0.0049	<5.10	<0.0049
030930743-0004										
AH-A-P1	PERSONAL AIR MONITORING	345.00	0.2340	0	None Detected			0.0048	<4.30	<0.0048
030930743-0005										
AH-A-P2	PERSONAL AIR MONITORING	339.00	0.2340	17	Amosite	0	2	0.0049	8.50	0.0097
030930743-0006										
AH-A-P3	PERSONAL AIR MONITORING	327.00	0.2470	1	Amosite	1	1	0.0048	8.10	0.0095
030930743-0007										

Analyst(s)

David Chen (3)

Evie Sioukri (5)

James Hall
James Hall, Laboratory Manager
or other approved signatory

The laboratory is not responsible for data reported in structures/cc, which is dependent on volume collected by non-laboratory personnel. This lab is only responsible for data reported in structures/mm². This report may not be reproduced, except in full, without written approval by EMSL. This report must not be used to claim product endorsement by NVLAP or any agency of the U.S. Government. This report relates only to the samples reported above. Quality control data (including 95% confidence limits and laboratory and analysts' accuracy and precision) is available upon request. As per 40 CFR 763, the initial screening test may not be applied to samples with collected volumes of <1200 liters. The test results contained within this report meet the requirements of NELAC unless otherwise noted. Samples received in good condition unless otherwise noted.

Samples analyzed by EMSL Analytical, Inc. New York 307 West 38th Street, New York NY NVLAP Lab Code 101048-9, AIHA IHLAP 102581, NYS ELAP 11506, CT PH-0170, MA AA000170

**EMSL Analytical, Inc.**

307 West 38th Street, New York, NY 10018

Phone: (212) 290-0051 Fax: (212) 290-0058 Email: manhattanlab@emsl.com

Attn: **AECOM Technical Services, Inc.**
4840 Cox Road
Richmond, VA 23060

Fax: (804) 515-8305 Phone: (804) 515-8300

Project: **60134596/ HELLER HEAT TREATING/ NJ**

Customer ID: EART59

Customer PO:

Received: 12/10/09 10:02 AM

EMSL Order: 030930743

EMSL Proj:

Analysis Date: 12/10/2009

Sampling Date: 12/8/2009

Test Report: Asbestos Fiber Analysis by Transmission Electron Microscopy (TEM)
Performed by EPA 40 CFR Part 763 Appendix A to Subpart E

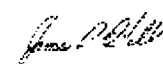
Sample	Location	Volume (Liters)	Area Analyzed (mm ²)	Non Ash	Asbestos Type(s)	# Structures		Analytical Sensitivity (S/cc)	Asbestos Concentration	
						$\geq 0.5\mu < 5\mu$	$\geq 5\mu$		(S/mm ²)	(S/cc)
AH-A-P4	PERSONAL AIR MONITORING	333.00	0.2340	2	Amosite	0	1	0.0049	4.30	0.0049

030930743-0008

Analyst(s)

David Chen (3)

Evie Sioukri (5)


James Hall, Laboratory Manager
or other approved signatory

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Samples analyzed by EMSL Analytical, Inc. New York 307 West 38th Street, New York NY NVLAP Lab Code 101048-9, AIHA IHLAP 102581, NYS ELAP 11506, CT PH-0170, MA AA000170

REGION II RST 2 ANALYTICAL SERVICES REQUEST FORM

To: Anthony Tao, CO
Helen Eng, PO

From: Cris D'Onofrio, OSC

Date: 2-Dec-09

Site Name: Alfred Heller Heat Treating Company

Date of Request: 2-Dec-09

Site Location: Clifton, NJ

Anticipated Sampling Date: 12/09/2009 to 12/18/2009

Anticipated Shipping Date: 12/09/2009 to 12/18/2009

SSID No.: A213

Turnaround Time: Verbal: 2-week

Site TDD No.: TIO-0013-0129

Written: 3-week

RST 2 Task No.: 3125

Saturday Delivery (Y/N) No

CLP Lab Requested: YES / NO Yes

DESA Lab Requested: YES / NO Yes

Justification for commercial analytical service and/or quick turn-around time: (OSC Only)

EPA OSC Signature: _____

No. of Samples	Sample Type / Matrix	Analysis Required	QA /QC Required	Unit Cost	Analysis Cost
4	Soil	Hexavalent Chromium via SW 846 Method 7196A	Definitive Data		
2	Aqueous	Hexavalent Chromium via SW 846 Method 7196A	Definitive Data		
1	Soil - MS/MSD	Hexavalent Chromium via SW 846 Method 7196A	Definitive Data		

Total Analytical Cost: \$ _____

Name of Laboratory	Contact	Date of Request	Date Reply Requested	Date of Reply	Total TDD Cost

RST 2 Analytical Coordinator: Smita Sumbaly

RST 2 SPM: Sayed Iqbal

Analytical Services TDD#: _____ Task#: _____